PHE National Influenza Report



Summary of UK surveillance of influenza and other seasonal respiratory illnesses

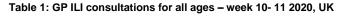
19 March 2020 – Week 12 report (up to week 11 data)

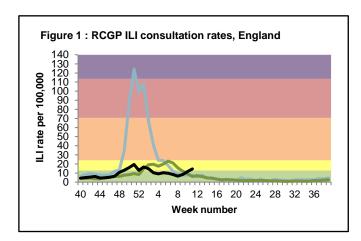
This report is published <u>online</u>. A summary report is being published once a fortnight while influenza activity is low. For further information on the surveillance schemes mentioned in this report, please see information available <u>online</u>.

Indicators for influenza have increased in primary care however remain low in other indicators. Primary care surveillance

• GP consultation rates for influenza-like illness (ILI) have increased and are now in the low intensity threshold in all UK schemes (Table 1 & Figure 1).

GP ILI consultation rates	Week number		Trend	Book ago group
(all ages)	10	11	Trenu	Peak age group
England (RCGP)	11.5	14.6	仓	15-44
Wales	5.1	11.9	仓	45-64
Scotland	9.4	27.6	٢	15-44
Northern Ireland	6.9	18.1	Ŷ	15-44







*The Moving Epidemic Method (MEM) has been adopted by the European Centre for Disease Prevention and Control to calculate thresholds for GP ILI consultations for the start of influenza activity (based on 10 seasons excluding 2009/10) in a standardised approach across Europe. For MEM intensity threshold values for this season, please visit: <u>https://www.gov.uk/guidance/sources-of-uk-flu-data-influenza-surveillance-in-the-ukttclinical-surveillance-through-primary-care</u>

- Syndromic surveillance (data up to 15 March 2020)
 - GP in Hours (GPIH) consultations for influenza-like illness (ILI) and asthma increased and were above seasonally expected levels, with the highest consultations seen in London and in the 15-64 year olds.
 - $\circ~$ GP Out of Hours (GPOOH) contacts for ILI and difficulty breathing increased further.
 - NHS 111 calls for cold/flu, cough, difficulty breathing and sore throat continued to increase in week 11, however there was a decrease noted over the weekend (14/15 March) in cold/flu calls.
 - Emergency Department attendances for ILI and asthma increased however attendances for other respiratory indicators (including pneumonia) remained stable.
 - For further information, please see the Syndromic surveillance webpage.

Outbreak Reporting

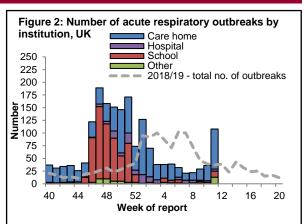
• 144 new acute respiratory outbreaks have been reported in the past 14 days (Figure 2).

 109 outbreaks were from care homes where seven tested positive for SARS-COV2, three for respiratory syncytial virus (RSV), 2 for influenza A(not subtyped) and one for rhinovirus.

 \circ 15 outbreaks were from schools where one tested positive for SARS-COV2 and another for influenza A(not subtyped).

 Seven outbreaks were from hospitals where two tested positive for SARS-COV2, one for influenza A(not subtyped) and another for influenza B.

 \circ 13 outbreaks were from the Other Settings category where four tested positive for SARS-COV2, one for influenza A(not subtyped) and one for influenza B.



• Outbreaks should be reported to the local Health Protection Teams and Respscidsc@phe.gov.uk.

Virological surveillance

• UK GP sentinel swabbing schemes

In week 11 2020, six samples tested positive for influenza (2 influenza A(H1N1)pdm09, 1 influenza A(H3N2) and 3 influenza B) with an overall positivity of 4.2% compared to 11.5% in the previous week, through the UK GP sentinel swabbing schemes (Figure 3).

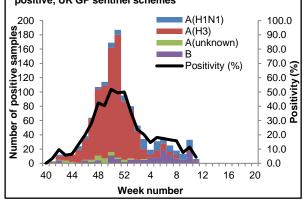
Since week 40, a total of 1,157 samples (133 influenza A(H1N1)pdm09, 871 influenza A(H3N2), 37 influenza A(not subtyped), 117 influenza B, five co-infection of influenza A(H3) and B, three co-infections of influenza A(H1N1)pdm09 and B, three co-infections of influenza A(H1N1)pdm09, influenza A(H3) and influenza B and one co-infection of influenza A(H1N1)pdm09 and influenza A(H3)) tested positive for influenza through this scheme.

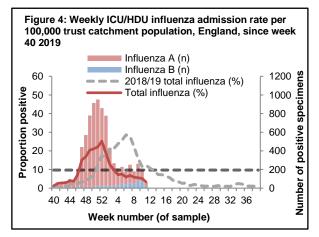
• Respiratory DataMart system (England)

In week 11 2020, out of the 1,752 respiratory specimens reported through the Respiratory DataMart System, 59 samples were positive for influenza (18 influenza A(H1N1)pdm09, 1 influenza A(H3), 16 influenza A(not subtyped) and 24 influenza B) (Figure 4), with an overall positivity of 3.4%. This remains below the baseline threshold of 9.7% for this season. The highest positivity was seen among the 5-14 year olds at 8.5% in week 11.

RSV positivity remained low at 0.8% in week 11. Rhinovirus positivity decreased slightly at 9.6% in week 11. Parainfluenza and adenovirus positivity remained low at 1.4% and 2.6% respectively in week 11. Human metapneumovirus (hMPV) positivity remained stable at 4.0% in week 11 2020.

Figure 3: Number of influenza positive samples and % positive, UK GP sentinel schemes



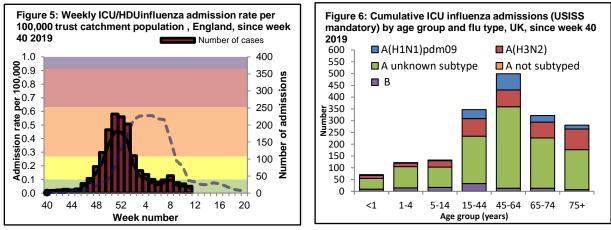


Secondary care surveillance

• USISS mandatory scheme - new ICU/HCU admissions and fatal confirmed cases, UK (provisional)

In week 11, there were 21 new admissions to ICU/HDU with confirmed influenza (2 influenza A(H1N1pdm09), 13 influenza A(not subtyped) and 6 influenza B) reported across the UK (133/143 Trusts in England) through the USISS mandatory ICU scheme, with a rate of 0.04 per 100,000 (Figures 5 and 6) compared to 0.05 per 100,000 in week 10. This is below the baseline threshold of 0.10 per 100,000. Four influenza laboratory confirmed deaths were reported to have occurred in ICU/HDU week 11 in the UK.

A total of 1,775 new admissions (158 influenza A(H1N1pdm09), 357 influenza A(H3N2), 1,153 influenza A(not subtyped) and 107 influenza B) and 101 confirmed deaths have been reported in the UK since week 40 2019.



*The Moving Epidemic Method (MEM) has been adopted by the European Centre for Disease Prevention and Control to calculate thresholds for ICU/HDU admission rates for the start of influenza activity (based on 7 seasons) in a standardised approach across Europe. For MEM threshold values, please visit: <u>https://www.gov.uk/guidance/sources-of-uk-flu-data-influenza-surveillance-in-the-uk#disease-severity-and-mortality-data</u>

• USISS Severe Respiratory Failure Centre (SRF) confirmed influenza admissions, UK

No new admissions for laboratory confirmed influenza were reported in week 11 2020 among the six reporting Severe Respiratory Failure centres in the UK.

Since week 40 2019 a total of 35 confirmed influenza admissions (12 influenza A(H1N1)pdm09, 7 influenza A(H3N2), 13 influenza A(unknown subtype) and 3 influenza B) were reported among ECMO centres.

All-cause mortality surveillance

• In week 11 2020, no significant excess was reported overall, by age group or by region after correcting ONS disaggregate data for reporting delay with the standardised weekly EuroMOMO algorithm (Table 2). This data is provisional due to the time delay in registration and so numbers may vary from week to week.

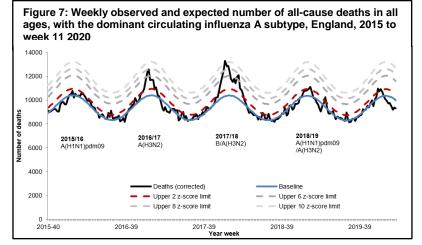


Table 2: Excess mortality by UK country, for all ages*					
Country	Excess detected in week 11 2020?	Weeks with excess in 2019/20			
England	х	51,01			
Wales	Х	01			
Northern Ireland	x	50-51;03			
Country	Excess detected in week 09 2020?	Weeks with excess in 2019/20			
Scotland	x	41,46, 49-51, 01-02			
* Excess mortality is calculated as the observed minus the expected number of deaths in weeks above threshold					

*Note: Delays in receiving all registered deaths from April 2018, following changes in IT systems at ONS, may result in some delays in the model to adjust for most recent deaths.

International Surveillance

• Influenza updated on 16 March 2020 (based on data up to 01 March 2020)

- In the temperate zone of the northern hemisphere, respiratory illness indicators and influenza activity appeared to decrease overall. In the temperate zones of the southern hemisphere, influenza activity remained at inter-seasonal levels. Worldwide, seasonal influenza A viruses accounted for the majority of detections.
- In North America, influenza-like illness (ILI) and influenza activity started to decline, with influenza A(H1N1)pdm09 and B viruses co-circulating.
- o In Europe, influenza activity remained elevated overall, though appeared to have peaked in some countries.
- o In Central Asia, influenza activity decreased with detections of all seasonal influenza subtypes.
- In Northern Africa, influenza activity continued to increase in Algeria and Tunisia, with detections of influenza A(H1N1)pdm09 and B viruses.
- o In Western Asia, influenza activity decreased in most countries, except in Armenia, Azerbaijan and Qatar.
- In East Asia, ILI and influenza activity decreased overall.
- In the Caribbean and Central American countries, influenza activity was reported in some countries. In Mexico, influenza activity decreased, with influenza A(H1N1)pdm09 viruses most frequently detected.
- o In tropical South American countries, influenza activity remained low.
- In tropical Africa, influenza detections were low across reporting countries.
- o In Southern Asia, increased influenza activity was reported in Bhutan.
- o In South East Asia, influenza activity continued to be reported in some countries.
- The WHO GISRS laboratories tested more than 233,445 specimens between 17 February 2020 and 01 March 2020. 62,423 were positive for influenza viruses, of which 42,013 (67.3%) were typed as influenza A and 20,410 (32.7%) as influenza B. Of the sub-typed influenza A viruses, 7,348 (74.5%) were influenza A(H1N1)pdm09 and 2,516 (25.5%) were influenza A(H3N2). Of the characterized B viruses, 18 (1.1%) belonged to the B-Yamagata lineage and 1,574 (98.9%) to the B-Victoria lineage.
- MERS-CoV latest update on 18 March 2020
 - Up to 18 March 2020, a total of five cases of Middle East respiratory syndrome coronavirus, MERS-CoV, (three imported and two linked cases) have been confirmed in the UK. On-going surveillance has identified 1,814 suspected cases in the UK since September 2012 that have been investigated for MERS-CoV and tested negative.
 - On <u>18 February 2020</u>, the National IHR Focal Point for Qatar reported one laboratory-confirmed case of Middle East Respiratory Syndrome coronavirus infection (MERS-CoV) to WHO.
 - Globally, since September 2012, WHO has been notified of 2,521 laboratory-confirmed cases of infection with MERS-CoV, including 866 associated deaths. Further guidance on the management of possible cases in the UK is available <u>online</u>. The latest ECDC MERS-CoV risk assessment can be found <u>here</u>, where it is highlighted that risk of widespread transmission of MERS-CoV remains very low.
- Avian/Zoonotic influenza latest update on 28 February 2020
 - Between <u>21 January to 28 February 2019</u>, two new human infections with avian A(H9N2) viruses (reported in China and Senegal respectively) and one new laboratory-confirmed human case of influenza A(H1N1)v virus infection (swine variant) (reported in China) have been reported.
 - For further updates please see the <u>WHO website</u> and for advice on clinical management in the UK please see information available <u>online</u>.
- <u>Coronavirus Disease 2019 (COVID-19)</u> latest update 18 March 2020
 - Up to <u>18 March 2020</u>, a total of 2,626 confirmed cases of COVID-19, have been confirmed in the UK. On-going surveillance has identified 53,595 suspected cases in the UK that tested negative.
 - Globally, up to 18 March 2020, <u>WHO</u> has been notified of 191,127 laboratory-confirmed cases of COVID-19 infection, including 7,807 related deaths.